EROSION AND SEDIMENT CONTROL NARRATIVE

RESPONSIBLE LAND DISTURBER

Upon award of the Construction Contract, the Contractor shall employ a Responsible Land Disturber, who is certified by the Department of Conservation and Recreation, to assume this responsibility for the project. The name of this person is to be designated in writing by the Contractor to the State ESC plan approving authority, Roanoke County Department of Erosion and Sediment Control, the A/E, and the Owner along with copies of their certification prior to any land disturbance. The Responsible Land Disturber for this project shall be in charge of and is responsible for carrying out the land-disturbing activities on this project. The certified Responsible Land Disturber may change at any time during the life of this project, as long as the State ESC plan approving authority and Roanoke County Department of Erosion and Sediment Control are notified in advance and in writing. Hereinafter RLS shall be interpreted as the Responsible Land Disturber. Relative to the SWPP Plan the RLD shall be the "Operator".

STORM WATER POLLUTION PREVENTION PLAN & REGISTRATION STATEMENT

This narrative also incorporates requirements related to the VPDES General Permit for Storm Water Discharges from Construction Sites. The basic SWPP Plan is included in the Contract Documents but may require revision and maintenance by the permittee per permit requirements as construction progresses. Should any conflict exist between this document and the Permit, the Permit shall take precedence.

RLD (as the contractor) shall file a Registration Statement as the Permit Holder with the Virginia Department of Conservation and Recreation at least two (2) days prior to commencement of any land disturbing activity. Contractor shall pay all associated fees. Obtain Registration Statement from DCR Regional Office or online.

PROJECT DESCRIPTION

The purpose of this project is to renovate the existing site and building at Northside High School in Roanoke County, VA. This project will include renovation of the existing high school building, several building additions, reconfiguration of the adjacent Northside High School Road, replacement of existing parking, utilities, and storm sewer.

A total of 16.50 acres will be disturbed as a part of this project.

EXISTING SITE CONDITIONS

All areas of the project site have been previously developed or graded. The majority of the site has already been paved to provide parking for Northside High School and the adjacent middle school. The site is divided into several drainage areas as shown on the Drainage Divide Sheets C-8.1 and C-8.2 and existing site runoff has been analyzed in the Drainage Calculations. Slopes throughout the site range widely, from 0% to 50%. All areas within the limits of disturbance are outside of the 100 Year Flood Plain.

ADJACENT PROPERTY

The site is bordered by recreational fields to the South and West that are owned and maintained by the School Board of Roanoke County. The site is bordered to the North by Northside Middle School. To the East, there are several properties consisting of residential, commercial, and religious uses. Appropriate buffer yards as required by Roanoke County shall be utilized between this project site and the adjacent properties.

⚠1 OFF-SITE AREAS

Offsite areas will be needed to waste asphalt, concrete, soils, etc. Prior to land disturbance at any off-site area, submit to Roanoke County Department of Community Development a copy of plans, land disturbing permit, and/or agreement in lieu approved by the appropriate Federal, State, or local authorities.

Should some material be wasted off-site to a site owned by others or the Contractor, it is the Contractor's responsibility to assure that said source has a current, approved Erosion Control Plan in accordance with the ESC Handbook and Regulations.

Should the borrow, excavation waste or spoil areas proposed not have a current approved ESC Plan, an ESC Plan shall be submitted and approved by the Department of Conservation and Recreation and local authorities prior to any land disturbances in accordance with the requirements of the Erosion Control notes in these plans and Virginia State Laws.

SOILS

A Subsurface Exploration and Geotechnical Analysis report dated February 15, 2007, has been performed by ECS Mid-Atlantic, LLC. A copy of the report has been included as a part of the project documents.

The predominant soils encountered on the site consist of low plasticity, fine to medium Sandy Clay and Silt, overlying very dense Fine to Medium Sandy Silt and Weathered Rock. Topsoil depths range from six to eight inches. Bedrock was only encountered at depths greater than 30', and consisted of brown siltstone or shale. Carbonate bedrock was not encountered in any borings.

Permeability is moderate in the soils encountered. Available water capacity is high, with medium surface runoff. The potential for erosion is high. Shrink/swell potential is low. Groundwater should not be expected at levels less than 20' below the original ground surface.

Because the project site has been previously developed and disturbed, it is possible that Urban land complex type soils may be encountered. These soils vary widely, and are usually the product of previously placed fill.

CRITICAL EROSION AREAS

The critical erosion areas on this project site will be mostly due to steep slopes. All slopes steeper than 3H:1V shall be matted in accordance with Virginia ESC Handbook section 3.36 with VDOT Standard EC-2 or equivalent.

An additional critical erosion area is at the North-West corner of the project site. An existing drainage ditch that leads to the existing stormwater management basin is highly eroded. Existing steep slopes at the entrance to the existing basin are also highly eroded. Regrade the drainage ditch and eroded slopes as shown on the grading plans. All disturbed steep slopes shall receive VDOT EC-2 matting or equivalent. The regraded drainage ditch shall receive VDOT EC-3 matting (Type A or B, as indicated on the grading plans).

EROSION AND SEDIMENT CONTROL MEASURES

Unless otherwise indicated, all vegetative and structural erosion and sediment control practices will be constructed and maintained in accordance with the minimum standards and specifications to the Virginia Erosion and Sediment Control Handbook, latest edition. References to VDOT refer to the Virginia Department of Transportation "Road and Bridge Standards and Specifications," latest edition.

STRUCTURAL PRACTICES

1. **Temporary Construction Entrance (CE) - Std. & Spec. 3.02**
   A temporary construction entrance shall be installed where the construction access road leaves existing pavement. During wet weather conditions, drivers of construction vehicles will be required to wash their wheels before entering the street.
2. **Construction Road Stabilization (CRS) - Std. & Spec. 3.03**
   All construction roads/travel lanes on the site shall be stabilized with gravel immediately after rough grading. Construction traffic shall be limited to access roads and areas to be graded. Traffic is prohibited from entering drainage swales or streams unless absolutely necessary.
3. **Silt Fence (SF) - Std. & Spec. 3.05**
   A temporary sediment barrier, consisting of a filter fabric stretched across and attached to support posts and entrenched, will be installed as indicated on the plans. This Std. is interchangeable with 3.04.
4. **Storm Drain Inlet Protection (IP) - Std. & Spec. 3.07**
   Protect inlets of storm sewers from erosion and sedimentation during construction.
5. **Culvert Inlet Protection (CIP) - Std. & Spec. 3.08**
   Protect inlets of storm sewers from erosion and sedimentation during construction.
6. **Outlet Protection (OP) - VDOT Std. EC-1, Type A**
   EC-1 Type A riprap is to be placed at the outlet of all culverts as indicated on the plans.
7. **Check Dams (CD) - Std. & Spec. 3.20**
   Small temporary stone dams constructed across a swale or drainage ditch to reduce the velocity of concentrated flows and trap sediment by temporarily ponding the runoff.
8. **Temporary Sediment Trap (ST) - Std. & Spec. 3.13**
   A gravel outlet constructed in an earthen embankment forming a small temporary ponding area which reduces runoff velocity to allow silt to settle out.
9. **Sediment Basin (>3 Ac) (SB) - Std. & Spec. 3.14**
   An impoundment with a controlled stormwater release structure designed to detain sediment-laden runoff from disturbed areas in "wet" and "dry" storage long enough for the majority of sediments to settle out.

STABILIZATION & VEGETATIVE PRACTICES

10. **Topsoiling (TO) - Std. & Spec. 3.30**
    Topsoil shall be stripped from all areas to be graded and stockpiled for later use and protected from erosion. Stockpile locations shall be approved by the Architect. See TOPSOILING, SEEDING, PLANTING notes on plans.
11. **Temporary Seeding (TS) - Std. & Spec. 3.31**
    The temporary diversion dikes, topsoil stockpiles and all areas to be rough graded, but not finish graded during the initial phase of construction, shall be seeded with fast germinating, temporary vegetation immediately following grading.
12. **Mulching (MU) - Std. & Spec. 3.35**
    Jute mesh or other degradable channel lining material shall be used to aid in establishing grass on slopes and in drainage ditches as indicated on the plans. It shall also be applied elsewhere in roadside ditches during construction if deemed necessary by the Design Engineer.
13. **Soil Stabilization Blankets & Matting (B/M) - Std. & Spec. 3.36**
    VDOT Std. EC-2 or EC-3 shall be used to aid in establishing grass on slopes (EC-2) or in drainage ditches (EC-3) as indicated on the plans.
14. **Tree Preservation & Protection (TP) - Std & Spec. 3.38**
    Insure the survival of desirable trees during construction, as indicated on the plans.

PERMANENT STABILIZATION

All exposed soil surfaces shall be seeded for permanent vegetative cover immediately following earthwork (within 7 days following finish grading).

MANAGEMENT STRATEGIES

1. The RLD shall amend the SWPP Plan whenever there is a change in design, construction, operation, or maintenance, which has a significant effect on the potential for the discharge of pollutants to surface waters and which has not otherwise been addressed in the plan or if the plan proves to be ineffective in eliminating or significantly minimizing pollutants from sources identified in the permit, or in otherwise achieving the general objectives of controlling pollutants in storm water discharges from construction activities. Also amend to identify any new contractor that will implement a measure of the plan.
2. The RLD shall be responsible for the installation and maintenance of all erosion and sediment control practices maintaining them in good and effective operating condition.
3. The RLD shall notify the Architect/Engineer when the local governing official has inspected and approved all in-place erosion and sediment control devices, required by local ordinances to be in place prior to land disturbance.
4. Construction shall be sequenced so that the duration of grading operations is as brief as possible.
5. Maintenance of inlet and outlet protection shall be given high priority.
6. Temporary seeding or other stabilization shall follow within 7 days after grading, or installation if a temporary measure.
7. Areas which are not to be disturbed shall be clearly marked by flags, signs, etc.
8. No solid materials, including building materials, garbage, and debris shall be discharged to surface waters of the State, except as authorized by a Section 404 permit.
9. Where construction vehicle access routes intersect paved public roads, provisions shall be made to minimize dust and the transport of sediment by vehicular tracking onto the paved surface. Where sediment is transported onto a public road surface, the road shall be cleaned thoroughly at the end of each day. Sediment shall be removed by shoveling or sweeping. Cleared sediment shall be returned to the point of likely origin or other suitable location. The general of dust shall be minimized. Bulk clearing of accumulated sediment shall not include flushing the area with water. Street washing shall be allowed only after sediment has been so removed.
10. Ensure and demonstrate compliance with applicable State and/or local waster disposal, sanitary sewer or septic system regulations.
11. All sediment removed from sediment trapping measures or cleaning operations shall be appropriately wasted so as not to become a dust or sediment problem elsewhere.

POTENTIAL POLLUTION SOURCES & STORED MATERIALS

The RLD shall prepare a list of all potential sources of pollution and all construction and waste materials expected to be stored on-site and update as appropriate. Examples would be vehicle fueling area, fuel delivery vehicle, fertilizer, chemicals, temp. sanitary waste facilities, etc. For each listed item list its location and describe necessary controls to reduce pollutants from these materials including storage practices to minimize exposure to storm water as well as spill prevention and response, schedule of implementation and maintenance necessary for effectiveness. Keep latest copy on the job site at all times and with the SWPPP package.

MAINTENANCE

In general, all erosion and sediment control measures shall be checked weekly and after each significant rainfall. The following items shall be checked in particular:

1. Inlet protection shall be checked regularly for sediment cleanout. Remove sediment prior to it reaching ½ the design depth of the trap.
2. Channel linings shall be checked regularly for undermining or deterioration. Stabilize immediately if not to spec.
3. Silt fences shall be checked regularly for structural/functional integrity. Remove any sediment deposits - do not allow buildup.
4. All seeded areas shall be checked regularly to see that a good stand is maintained. Areas should be fertilized and reseeded as needed.
5. Temporary sediment basin shall be checked regularly for sediment build-up. Remove sediment buildup prior to it reaching the cleanout level.
6. Detention basin and sediment forebay shall be checked regularly for sediment build-up. Remove any sediment deposits - do not allow buildup.

INSPECTIONS

The RLD shall inspect disturbed areas of the construction site and areas used for storage of materials that are exposed to precipitation, structural control measures, and locations where vehicles enter or exit the site. The inspections shall be conducted at least once every seven (7) calendar days and within twenty-four (24) hours of the end of a storm event of ½ inch or greater.

Disturbed areas and areas used for storage of materials that are exposed to precipitation shall be inspected for evidence of, or the potential for, pollutants entering the drainage system. ESC measures identified in the plan shall be observed to ensure that they are operating correctly. Where discharge locations or points are accessible, they shall be inspected to ascertain whether erosion control measures are effective in preventing significant impacts to receiving waters. Locations where vehicles enter or exit the site shall be inspected for evidence of off-site sediment tracking.

Based on the results of the inspection, the site description identified in the plan and pollution prevention measures shall be revised as appropriate, within seven (7) calendar days following the inspection. Such modifications shall provide for timely implementation of any changes to the plan within seven (7) calendar days following the inspection and before next anticipated storm event, if practical.

REPORTING

A report summarizing the scope of the inspection, names and qualifications of personnel making the inspection, the date of the inspection, major observations relating to the implementation of the storm water pollution prevention plan and actions taken as a result of the inspection shall be made and retained as part of the SWPP Plan. Where no incidents of noncompliance are reported, report shall certify that facility is in compliance with SWPP Plan and permit; keep reports with this narrative. The report shall be certified in accordance with the permit.

STORM WATER MANAGEMENT

Due to the gradual addition of parking lots and other onsite developments, existing runoff from the site exceeds the downstream capacity in several locations. The proposed stormwater management facilities have been designed to correct the inadequate downstream capacity, improve runoff water quality, and meet all Roanoke County and Commonwealth of Virginia Standards.

An oversized detention basin (Basin #1) shall be installed at the southern end of the project site as shown on the grading plan. This basin will reduce flows during a 10-year storm to below preconstruction 2-year storm rates and reduce flows from a 25-year storm to below preconstruction 10-year storm rates. Flows will be reduced drastically, so that all downstream channels will be adequate per MS-19 standards. The basin will also provide a significant improvement in runoff water quality in comparison to the present condition. During construction, Basin #1 will serve as a Sediment Basin. The Sediment Basin size and shape shall be the same as the final Detention Basin design. See Detail 31/C-5.3 for information regarding Sediment Basin Outlet Riser Pipe configuration.

⚠1

The existing detention basin to the North-West of the project site (Basin #2) was originally designed to provide capacity for a drainage area that is much more highly developed than what will ever occur on this site. Therefore, no modifications are needed at this basin. However, an appropriately sized sediment forebay shall be installed as shown on the plans at the entrance to the existing basin as a part of this project. This will provide enhanced environmental quality and allow easier maintenance of the facility. During construction, the sediment forebay will serve as a Sediment Trap. The Sediment Trap shall have the same size and shape as the final Sediment Forebay design.

All water currently leaving the site to the West is contained by an adequate ditch and culverts. Runoff after construction in this area will be slightly reduced, so the downstream channels will remain adequate. Additional stormwater management measures are not proposed for this section of the project site.

UNDERGROUND UTILITY INSTALLATION

Underground utility lines shall be installed in accordance with the following standards in addition to other applicable criteria:
No more than 500 linear feet of trench may be open at one time.
Excavated material shall be placed on the uphill side of trenches.
Effluent from dewatering operations shall be filtered or passed through an approved sediment trapping device, or both, and discharged in a manner that does not adversely affect flowing streams or off-site property.
Re-establishment of disturbed area shall be accomplished in accordance with the ESC Handbook and contract documents.
Applicable safety regulations shall be complied with.

PROHIBITION OF NON-STORM WATER DISCHARGES

1. The following non-storm water discharges are allowed: discharges from fire fighting activities; fire hydrant flushing; waters used to wash vehicles where detergents are not used; water used to control dust; potable water sources including waterline flushing; hydrostatic testing; routine external building washdown which does not use detergents; pavement washwaters where spills or leaks of toxic or hazardous materials have not occurred (unless all spill material has been removed) and where detergents are not used; air conditioning condensate; uncontaminated compressor condensate; uncontaminated ground water or spring water; and foundation or footing drains where flows are not contaminated with process materials such as solvents.
2. Except for allowed discharges listed above, sources of non-storm water that are combined with storm water discharges from the construction site must be identified on the plan. The plan shall identify and ensure the implementation of appropriate pollution prevention measures for the nonstorm water components.

CONTRACTORS

Identify for each measure identified in the plan, the Contractor/subcontractor that will implement the measure. All contractors identified above must sign the following certification statement. All certifications must be included in the SWPP Plan.

"I certify under penalty of law that I understand the terms and conditions of this Virginia Pollutant Discharge Elimination System (VPDES) general permit that authorizes the storm water discharges from the construction activity identified as part of this certification."

Name & title of signatory (Responsible Corporate Official, General Partner, or Sole Proprietor)
Name, address & phone of contracting firm
Address of other identifying description of the site
Date certification made

DISPLAY & STATUS OF PLAN

Plan with a copy of the permit must be maintained on-site and kept available for DCR inspectors at all times form the date of commencement of construction to the date of final stabilization. Note that this narrative and RLDs log of inspection reports and all certifications are part of the plan (keep with this narrative).

The Plan with all attachments, reports, etc. shall be retained by the contractor for at least three (3) years from the date that the site is finally stabilized.

SCHEDULE

Record of the dates when major grading activities occur, when construction activities temporarily or permanently cease on a portion of the site, and when stabilization measures are initiated.

Perimeter controls shall be installed after clearing and grubbing necessary for installation of the measure, but before the clearing and grubbing for the remaining portions of the site. The perimeter controls shall be actively maintained until final stabilization of those portions of the site upward of the perimeter control. Temporary perimeter controls may be removed after final stabilization.

Stabilization measures shall be initiated as soon as practicable in portions of the site where construction activities have temporarily or permanently ceased, but in no case more than seven (7) days after the construction activities have temporarily or permanently ceased, unless construction activity will resume within twenty-one (21) days after ceasing. Permanent seeding shall be done within 30 days if construction has permanently ceased.

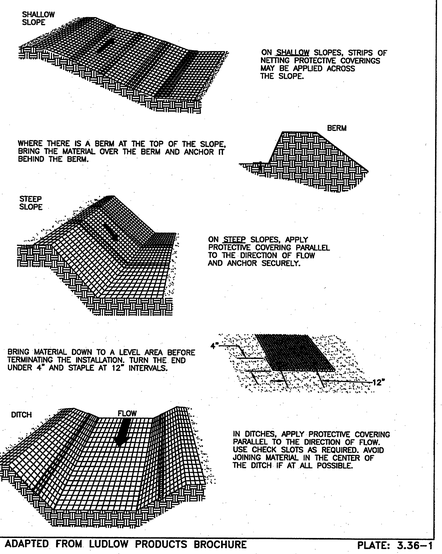
Whenever water seeps from a slope face, adequate subsurface interception (french drain) shall be provided discharging to the nearest suitable stabilized channel.

All temporary ESC measures shall be removed within 30 days after final site stabilization or after the temporary measures are no longer needed, unless otherwise authorized by the local program administrator. Trapped sediment and other disturbed soil areas resulting from the disposition of temporary measures shall be permanently stabilized to prevent further erosion and sedimentation.

NOTICE OF TERMINATION

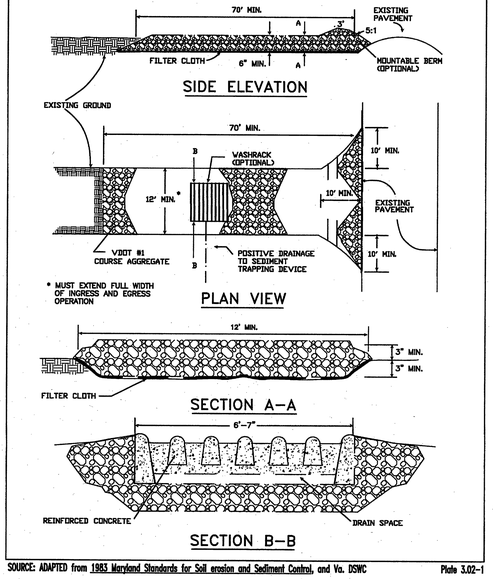
When the site has been finally stabilized and all the storm water discharges from construction activities that are authorized by the permit are eliminated, the permit holder must submit a Notice of Termination that is certified in accordance with permit. The terms and conditions of the permit shall remain in effect until a completed Notice of Termination is submitted to DCR.

TYPICAL ORIENTATION OF TREATMENT – 1 (SOIL STABILIZATION BLANKET)



SOURCE: ADAPTED FROM LUDLOW PRODUCTS BROCHURE PLATE: 3.36–1

STONE CONSTRUCTION ENTRANCE

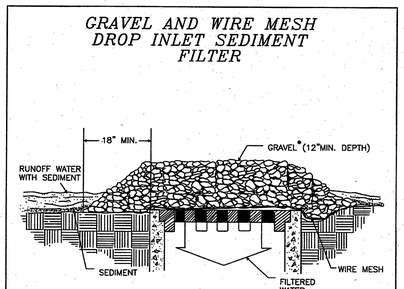


SOURCE: ADAPTED from 1983 Maryland Standards for Soil erosion and Sediment Control, and Va. DSWC Plate 3.02–1

MINIMUM STANDARDS COMPLIANCE

MS-1: TS & PS have been required on the plans and notes.
MS-2: All onsite soil stockpiles shall be stabilized per note on plans. Any offsite borrow or fill areas shall require a separate erosion and sediment control permit.
MS-3: Permanent vegetative cover is required on all denuded areas per notes on plans.
MS-4: The plans require that all sediment trapping measures be installed as a first step at the start of construction.
MS-5: All areas are required to receive permanent stabilization immediately after final grade is established.
MS-6: Proposed detention basin and sediment forebay will function as adequately sized sediment basins. The majority of the site is already paved, so potential for erosion is small.
MS-7: Cut and fill slope stabilization is required in the plans. No new slopes exceed 2.5H:1V.
MS-8: Concentrated runoff is contained within ditches, culverts, and storm sewer and shall not flow down cut or fill slopes.
MS-9: Seepage control is required if encountered during construction.
MS-10: Inlet protection on storm sewer inlets has been indicated on the drawings.
MS-11: Outlet protection is required for all pipe outlets and receiving channels.
MS-12: Work within a live watercourse is not applicable.
MS-13: Work within a live watercourse is not applicable.
MS-14: Work within a live watercourse is not applicable.
MS-15: Work within a live watercourse is not applicable.
MS-16: Erosion control for utility installations is required in the plans. All dewatering operations (including Sediment Basin dewatering) shall satisfy the requirements provided in these plans, Section 2374 of the Project Specifications, and the Virginia Erosion and Sediment Control Handbook (current edition).
MS-17: A construction entrance is required for this project.
MS-18: Criteria for removal of ESC measures is stipulated in the plans.
MS-19:
a) All concentrated flow is discharged to adequate existing channels.
b) Downstream channel adequacy: (Flow exits the project in three directions)
1)Drainage exits the south side of the site via culverts from the proposed detention basin. The basin has been oversized so that the downstream channels and storm culverts will adequately carry the runoff during a 10 year storm.
2)Drainage leaving the north side of the site flows via storm sewer and channels to an existing detention basin that was originally designed to control a much more highly developed site. A sediment forebay will be added to the existing basin. The existing basin outlets to an adequate downstream channel.
3)Drainage leaving the west side of the site is directed to an adequate roadside ditch. Stormwater detention or retention is not needed in this area.
c) With the proposed stormwater management practices, all downstream channels will be adequate. Wet weather conditions during construction will be observed by the contractor and the design engineers.
d) All improvements are located on School Board of Roanoke County property.
e) Hydrologic analyses are based on the existing watershed characteristics and ultimate development. All existing conditions are considered to be in hydrologically good condition. Conservative values have been used throughout.
f) Detention basin will be maintained by the contractor prior to project completion. After project completion, all maintenance will be performed by the School Board of Roanoke County, Roanoke County, and their resident maintenance staff.
g) Flow leaving the site has been reduced and is directed to adequate channels.
h) Subdivision development not applicable.
i) Commercial or Industrial subdivision not applicable.

GRAVEL AND WIRE MESH DROP INLET SEDIMENT FILTER



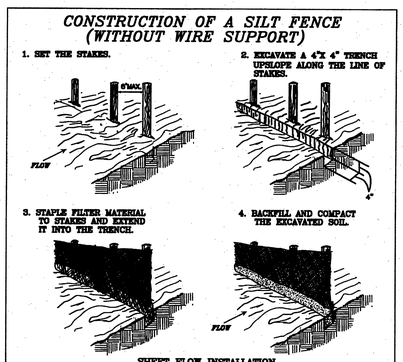
SPECIFIC APPLICATION

THIS METHOD OF INLET PROTECTION IS APPLICABLE WHERE HEAVY CONCENTRATED FLOWS ARE EXPECTED, BUT NOT WHERE PONDING AROUND THE STRUCTURE MIGHT CAUSE EXCESSIVE INCONVENIENCE OR DAMAGE TO ADJACENT STRUCTURES AND UNPROTECTED AREAS.

* GRAVEL SHALL BE VDOT #3, #357 OR #5 COARSE AGGREGATE.

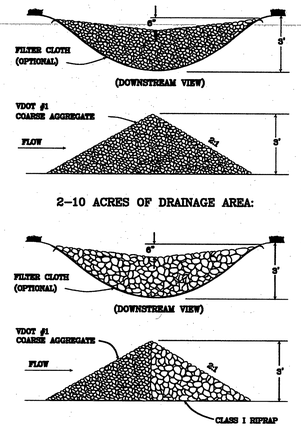
SOURCE: VA. DSWC PLATE. 3.07–2

CONSTRUCTION OF A SILT FENCE (WITHOUT WIRE SUPPORT)



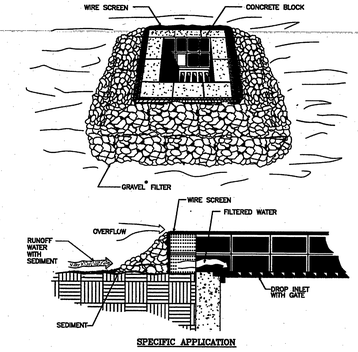
SOURCE: Adapted from Installation of Sheet and Fabric Filter Barriers for Sediment Control, VA. DSWC Sherwood and Wyant PLATE. 3.05–2

ROCK CHECK DAM



SOURCE: VA. DSWC PLATE. 3.20–1

BLOCK AND GRAVEL DROP INLET SEDIMENT FILTER



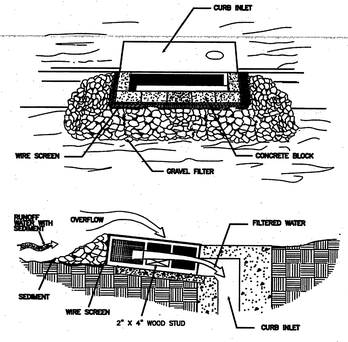
SPECIFIC APPLICATION

THIS METHOD OF INLET PROTECTION IS APPLICABLE WHERE HEAVY FLOWS ARE EXPECTED AND WHERE AN OVERFLOW CAPACITY IS NECESSARY TO PREVENT EXCESSIVE PONDING AROUND THE STRUCTURE.

* GRAVEL SHALL BE VDOT #3, #357 OR #5 COARSE AGGREGATE.

SOURCE: VA. DSWC PLATE. 3.07–3

BLOCK & GRAVEL CURB INLET SEDIMENT FILTER



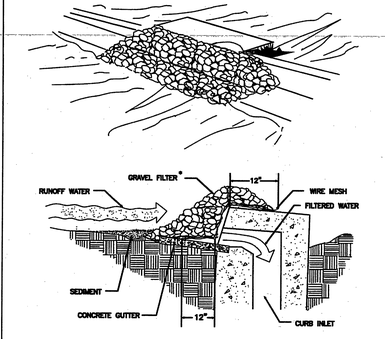
SPECIAL APPLICATION

THIS METHOD OF INLET PROTECTION IS APPLICABLE AT CURB INLETS WHERE AN OVERFLOW CAPABILITY IS NECESSARY TO PREVENT EXCESSIVE PONDING IN FRONT OF THE STRUCTURE.

* GRAVEL SHALL BE VDOT #3, #357 OR #5 COARSE AGGREGATE

SOURCE: VA. DSWC PLATE 3.07–8

GRAVEL CURB INLET SEDIMENT FILTER



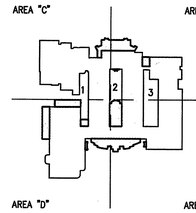
SPECIFIC APPLICATION

THIS METHOD OF INLET PROTECTION IS APPLICABLE AT CURB INLETS WHERE PONDING IN FRONT OF THE STRUCTURE IS NOT LIKELY TO CAUSE INCONVENIENCE OR DAMAGE TO ADJACENT STRUCTURES AND UNPROTECTED AREAS.

* GRAVEL SHALL BE VDOT #3, #357 OR 5 COARSE AGGREGATE.

SOURCE: VA. DSWC PLATE 3.07–6

KEY PLAN



GENERAL NOTES

APPROVED

SPECTRUM DESIGN

10 CHURCH AVE SE, PLAZA SUITE 1 ROANOKE, VIRGINIA 24011 540.342.6001
ROANOKE • MARION

ADDITIONS AND RENOVATIONS TO NORTHSIDE HIGH SCHOOL

ROANOKE COUNTY PUBLIC SCHOOLS
VA DOE #80-52G

SPECTRUM DESIGN PROJECT NO. 06055

COMMONWEALTH OF VIRGINIA — MICHAEL A. RAKES — NO 028199 — 6/8/07 — PROFESSIONAL ENGINEER

DATE	15 APRIL, 2007
DESIGN ARCHITECT	
PROJECT ARCHITECT	
PROJECT ENGINEER	MAR
CHECKED BY	
DRAWN BY	CEV

REVISIONS	NUMBER	DATE
COUNTY REVIEW	1	5/25/07

SHEET TITLE

ESC NARRATIVE AND DETAILS

C-5.6